CML001

MORLINA(R) OIL 100

65631

07/07/97

SHELL MATERIAL SAFETY DATA SHEET

BE SAFE. READ OUR PRODUCT SAFETY INFORMATION ... AND PASS IT ON.

PRODUCT LIABILITY LAW REQUIRES IT!

******* MATERIAL SAFETY DATA SHEET 61044 - 02 **************

MORLINA(R) OIL 100

SH MSDS: 61044 - 02 T 07/07/97

MANUFACTURER'S NAME AND ADDRESS

SHELL OIL COMPANY

PRODUCT SAFETY & COMPLIANCE

P.O. BOX 4320

HOUSTON, TX 77210

TELEPHONE NUMBERS:

24 HOUR EMERGENCY ASSISTANCE

SHELL: 713-473-9461 CHEMTREC: 800-424-9300

GENERAL MSDS ASSISTANCE SHELL: 713-241-4819

NAME

SECTION I -

PRODUCT: MORLINA(R) OIL 100
CHEM NAME: MIXTURE (SEE SECTION II-A)

ACUTE HEALTH HAZARD: 1

CHEM FAMILY: PETROLEUM HYDROCARBON; CIRCULATING

FIRE HAZARD: 1

OIL

SHELL CODE: 65631

REACTIVITY: 0

SECTION II-A

PRODUCT/INGREDIENT

NO. COMPOSITION

CAS

PERCENT

MORLINA OIL 100

HYDROTREATED HEAVY PARAFFINIC

64742-54-7 >99

DISTILLATE

2 ADDITIVES MIXTURE <1

NFPA HAZARD RATING: HEALTH 0 FIRE 1 REACTIVITY 0

SECTION II-B |

ACUTE TOXICITY DATA

ACUTE INHALATION LC50

NO. ACUTE ORAL LD50 _____

ACUTE DERMAL LD50

P NOT AVAILABLE 1 >5.0 G/KG, RAT* NOT AVIALABLE NOT AVIALABLE NOT AVAILABLE >5.0 G/KG, RABBIT* NOT AVAILABLE

* BASED ON API STUDIES

SECTION III |

HEALTH INFORMATION

THE HEALTH EFFECTS NOTED BELOW ARE CONSISTENT WITH REQUIREMENTS UNDER THE OSHA HAZARD COMMUNICATION STANDARD (29 CFR 1910.1200).

EYE CONTACT:

BASED ON ESSENTIALLY SIMILAR PRODUCT TESTING, PRODUCT IS PRESUMED TO BE NON-IRRITATING TO THE EYES.

SKIN CONTACT:

BASED ON ESSENTIALLY SIMILAR PRODUCT TESTING, PRODUCT IS PRESUMED TO BE NON-IRRITATING TO THE SKIN. PROLONGED AND REPEATED CONTACT MAY RESULT IN SKIN DISORDERS SUCH AS DERMATITIS, OIL ACNE OR FOLLICULITIS. ACCIDENTAL RELEASE UNDER HIGH PRESSURE APPLICATIONS MAY RESULT IN INJECTION OF OIL INTO THE SKIN CAUSING LOCAL NECROSIS.

INHALATION:

THE INHALATION OF VAPORS (GENERATED AT HIGH TEMPERATURES ONLY) OR OIL MIST MAY CAUSE A MILD IRRITATION OF THE UPPER RESPIRATORY TRACT.

INGESTION:

BASED ON ESSENTIALLY SIMILAR PRODUCT TESTING, PRODUCT IS PRESUMED TO BE NO MORE THAN SLIGHTLY TOXIC IF INGESTED.

SIGNS AND SYMPTOMS:

IRRITATION AS NOTED ABOVE. NECROSIS MAY BE EVIDENCED BY DELAYED ONSET OF PAIN AND TISSUE DAMAGE A FEW HOURS FOLLOWING HIGH PRESSURE INJECTION.

AGGRAVATED MEDICAL CONDITIONS:

PREEXISTING SKIN AND RESPIRATORY DISORDERS MAY BE AGGRAVATED BY EXPOSURE TO THIS PRODUCT.

OTHER HEALTH EFFECTS:

THIS PRODUCT AND ITS COMPONENTS ARE NOT CLASSIFIED AS CARCINOGENS BY INTERNATIONAL AGENCY FOR RESEARCH ON CANCER (IARC), NATIONAL TOXICOLOGY PROGRAM (NTP) OR OCCUPATIONAL SAFETY AND HEALTH ADMINISTRATION (OSHA).

FOR A SPANISH TRANSLATION OF THIS MSDS, CALL 1-800-240-MSDS.

SECTION IV OCCUPATIONAL EXPOSURE LIMITS						
NO.	OSHA PEL/TWA	PEL/CEILING	ACGIH TLV/TWA	TLV/STEL	OTHER	
P	5 MG/M3*	NONE	5 MG/M3*	10 MG/M3*		
*0II	MIST, MINERAL					
SECT	SECTION V EMERGENCY AND FIRST AID PROCEDURES					

EYE CONTACT: FLUSH EYES WITH WATER. IF IRRITATION OCCURS, GET MEDICAL

ATTENTION.

SKIN CONTACT: REMOVE CONTAMINATED CLOTHING AND WIPE EXCESS OFF. WASH WITH SOAP

AND WATER OR A WATERLESS HAND CLEANER FOLLOWED BY SOAP AND WATER. IF IRRITATION OCCURS, GET MEDICAL ATTENTION. IF MATERIAL IS

INJECTED UNDER THE SKIN, GET MEDICAL ATTENTION PROMPTLY TO PREVENT SERIOUS DAMAGE; DO NOT WAIT FOR SYMPTOMS TO DEVELOP.

REMOVE VICTIM TO FRESH AIR AND PROVIDE OXYGEN IF BREATHING IS INHALATION:

DIFFICULT. GET MEDICAL ATTENTION.

DO NOT INDUCE VOMITING. IN GENERAL, NO TREATMENT IS NECESSARY INGESTION:

UNLESS LARGE QUANTITIES OF PRODUCT ARE INGESTED. HOWEVER, GET

MEDICAL ADVICE.

NOTE TO PHYSICIAN: IN GENERAL, EMESIS INDUCTION IS UNNECESSARY IN HIGH

VISCOSITY, LOW VOLATILITY PRODUCTS, I.E., MOST OILS AND

GREASES.

SECTION VI | SUPPLEMENTAL HEALTH INFORMATION ______

NONE IDENTIFIED.

SECTION VII | PHYSICAL DATA

BOILING POINT (DEG F): SPECIFIC GRAVITY (H20=1): VAPOR PRESSURE (MM HG):

NOT AVAILABLE

0.8816

<0.1

MELTING POINT (DEG F): SOLUBILITY (IN WATER): VAPOR DENSITY (AIR=1):
O (POUR POINT) NEGLIGIBLE NOT AVAILABLE

0 (POUR POINT)

NEGLIGIBLE

NOT AVAILABLE

VISCOSITY: 95-105 (CS @ 104 DEG F)

EVAPORATION RATE (NORMAL BUTYL ACETATE = 1): NOT AVAILABLE

APPEARANCE AND ODOR: PALE YELLOW OIL. SLIGHT HYDROCARBON ODOR.

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SECTION VIII |

FIRE AND EXPLOSION HAZARDS

FLASH POINT AND METHOD: 425 DEG F. (PMCC)

FLAMMABLE LIMITS/% VOLUME IN AIR: LOWER: N/AV

EXTINGUISHING MEDIA:

USE WATER FOG, FOAM, DRY CHEMICAL OR CO2. DO NOT USE A DIRECT STREAM OF WATER. PRODUCT WILL FLOAT AND CAN BE REIGNITED ON SURFACE OF WATER.

SPECIAL FIRE FIGHTING PROCEDURES AND PRECAUTIONS: MATERIALS WILL NOT BURN UNLESS PREHEATED. DO NOT ENTER CONFINED FIRE SPACE WITHOUT FULL BUNKER GEAR (HELMET WITH FACE SHIELD, BUNKER COATS, GLOVES AND RUBBER BOOTS), INCLUDING A POSITIVE PRESSURE NIOSH APPROVED SELF-CONTAINED BREATHING APPARATUS. COOL FIRE EXPOSED CONTAINERS WITH WATER.

UNUSUAL FIRE AND EXPLOSION HAZARDS:

SECTION IX REACTIVITY

HAZARDOUS POLYMERIZATION: WILL NOT OCCUR STABILITY: STABLE

CONDITIONS AND MATERIALS TO AVOID:

AVOID HEAT, OPEN FLAMES, AND OXIDIZING MATERIALS.

HAZARDOUS DECOMPOSITION PRODUCTS:

THERMAL DECOMPOSITION PRODUCTS ARE HIGHLY DEPENDENT ON THE COMBUSTION CONDITIONS. A COMPLEX MIXTURE OF AIRBORNE SOLID, LIQUID, PARTICULATES AND GASES WILL EVOLVE WHEN THIS MATERIAL UNDERGOES PYROLYSIS OR COMBUSTION. CARBON MONOXIDE AND OTHER UNIDENTIFIED ORGANIC COMPOUNDS MAY BE FORMED UPON COMBUSTION.

EMPLOYEE PROTECTION SECTION X |

RESPIRATORY PROTECTION:

IF EXPOSURE MAY OR DOES EXCEED OCCUPATIONAL EXPOSURE LIMITS (SEC. IV) USE A NIOSH-APPROVED RESPIRATOR TO PREVENT OVEREXPOSURE. IN ACCORD WITH 29 CFR 1910.134 USE EITHER AN ATMOSPHERE-SUPPLYING RESPIRATOR OR AN AIR-PURIFYING RESPIRATOR FOR ORGANIC VAPORS AND PARTICULATES.

PROTECTIVE CLOTHING:

WEAR CHEMICAL-RESISTANT GLOVES AND OTHER PROTECTIVE CLOTHING AS REQUIRED TO MINIMIZE PROLONGED SKIN CONTACT. NO SPECIAL EYE PROTECTION IS ROUTINELY NECESSARY. TEST DATA FROM PUBLISHED LITERATURE AND/OR GLOVE AND CLOTHING MANUFACTURERS INDICATE THE BEST PROTECTION IS PROVIDED BY NITRILE GLOVES.

Δ	חח	TTT	ONAT.	PROTECTIVE	MEASURES:

SECTION XI	ENVIRONM	ENTAL PROTECTION				
SPILL OR LEAK I MAY BURN ALTI UP LARGE SPII CLOTHING AS A CONTAIN. REI UP RESIDUE WI DISPOSE OF PI	PROCEDURES: HOUGH NOT READILY IO LLS. *** LARGE SPIT APPROPRIATE. SHUT OF MOVE WITH VACUUM TRI ITH AN ABSORBENT SUCROPERLY. FLUSH ARE	GNITABLE. USE CAUTIOUS JUDGMENT WHEN CLEANING LLS *** WEAR RESPIRATOR AND PROTECTIVE OFF SOURCE OF LEAK IF SAFE TO DO SO. DIKE AND CUCKS OR PUMP TO STORAGE/SALVAGE VESSELS. SOAK ICH AS CLAY, SAND OR OTHER SUITABLE MATERIAL; AN WITH WATER TO REMOVE TRACE RESIDUE. *** AN ABSORBENT MATERIAL AND DISPOSE OF PROPERLY.				
SECTION XII	SPECIA	L PRECAUTIONS				
MINIMIZE PROLONGED SKIN CONTACT. WASH WITH SOAP AND WATER BEFORE EATING, DRINKING, SMOKING OR USING TOILET FACILITIES. LAUNDER CONTAMINATED CLOTHING BEFORE REUSE. PROPERLY DISPOSE OF CONTAMINATED LEATHER ARTICLES, INCLUDING SHOES, THAT CANNOT BE DECONTAMINATED. STORE IN A COOL, DRY PLACE WITH ADEQUATE VENTILATION. KEEP AWAY FROM OPEN FLAMES AND HIGH TEMPERATURES.						
SECTION XIII	TRANSPORTA	TION REQUIREMENTS				
D D 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	TRANSPORTATION CLAS					
D.O.T. PROPER	SHIPPING NAME:					
OTHER REQUIREM	ENTS:					

THE COMPONENTS OF THIS PRODUCT ARE LISTED ON THE EPA/TSCA INVENTORY OF CHEMICAL SUBSTANCES.

PROTECTION OF STRATOSPHERIC OZONE (PURSUANT TO SECTION 611 OF THE CLEAN AIR ACT AMENDMENTS OF 1990): PER 40 CFR PART 82, THIS PRODUCT DOES NOT CONTAIN NOR WAS IT DIRECTLY MANUFACTURED WITH ANY CLASS I OR CLASS II OZONE DEPLETING SUBSTANCES.

IN ACCORDANCE WITH SARA TITLE III, SECTION 313, THE ATTACHED ENVIRONMENTAL DATA SHEET (EDS) SHOULD ALWAYS BE COPIED AND SENT WITH THE MSDS.

http://www.islandoilsupply.com/shell/msds/061044.txt

SECTION XIV | OTHER REGULATORY CONTROLS

SECTION	XV	1	STATE	REGULATORY	INFORMATION
	2 L V		~	11200211	

BASED ON INFORMATION AVAILABLE TO SHELL, THIS PRODUCT DOES NOT CONTAIN ANY CHEMICAL SUBSTANCE REGULATED BY A SPECIFIC STATE LIST.

SECTION XVI

SPECIAL NOTES

PRODUCT REFORMULATED. MSDS REVISED IN SECTIONS II-A AND EDS SECTION I, TO REFLECT NEW INGREDIENTS. THE PERFORMANCE SPECIFICATIONS OF THE PRODUCT HAVE NOT CHANGED. THE HAZARD EVALUATION OF THE PRODUCT HAS NOT CHANGED. A SPANISH TRANSLATION OF THIS MSDS MAY BE OBTAINED BY CALLING 1-800-240-MSDS.

._____

THE INFORMATION CONTAINED HEREIN IS BASED ON THE DATA AVAILABLE TO US AND IS BELIEVED TO BE CORRECT. HOWEVER, SHELL MAKES NO WARRANTY, EXPRESSED OR IMPLIED REGARDING THE ACCURACY OF THESE DATA OR THE RESULTS TO BE OBTAINED FROM THE USE THEREOF. SHELL ASSUMES NO RESPONSIBILITY FOR INJURY FROM THE USE OF THE PRODUCT DESCRIBED HEREIN.

WE ARE PROVIDING OUR MOST RECENT MATERIAL SAFETY DATA SHEET AND/OR ENVIRONMENTAL DATA SHEET. IF YOU WISH TO RECEIVE UPDATES TO THIS INFORMATION, PLEASE CALL SHELL'S GENERAL MSDS ASSISTANCE LINE (713-241-4819) TO ENSURE THAT YOU ARE ADDED TO SHELL'S REGULAR MSDS DISTRIBUTION SYSTEM.

BE SAFE. READ OUR PRODUCT SAFETY INFORMATION...AND PASS IT ON. (PRODUCT LIABILITY LAW REQUIRES IT)

SHELL OIL COMPANY PRODUCT SAFETY AND COMPLIANCE P. O. BOX 4320 HOUSTON, TX. 77210

******* ENVIRONMENTAL DATA SHEET 61044 - 02 ****************

EDS: 61044 - 02 T 07/07/97

PRODUCT NAME: MORLINA(R) OIL 100

PRODUCT CODE: 65631

MANUFACTURER'S NAME AND ADDRESS SHELL OIL COMPANY P.O. BOX 4320 HOUSTON, TX 77210

TELEPHONE NUMBERS:

24 HOUR EMERGENCY ASSISTANCE

http://www.islandoilsupply.com/shell/msds/061044.txt

SHELL: 713-473-9461

CHEMTREC: 800-424-9300

FOR ADDITIONAL INFORMATION ON THIS ENVIRONMENTAL DATA PLEASE CALL 713-241-2252

SECTION I PRODUCT COMPOSITION						
NO.	COMPOSIT	ION			CAS	PERCENT
P 1 2	MORLINA HYDROTRE LLATE ADDITIVE	ATED HEAVY	PARAFFINIC	DISTI	MIXTURE 64742-54-7 MIXTURE	
SECTION II SARA TITLE III INFORMATION						
NO.			SEC-313 (*3))RY 	311/312 CATEGORY (*5)

BASED ON THE DATA AVAILABLE TO SHELL THIS PRODUCT CONTAINS NO HAZARDOUS SUBSTANCES AS DEFINED BY SARA TITLE III, SECTION 311(E).

*1 = REPORTABLE QUANTITY OF EXTREMELY HAZARDOUS SUBSTANCE, SEC 302

*2 = THRESHOLD PLANNING QUANTITY, EXTREMELY HAZARDOUS SUBSTANCE, SEC 302

*3 = TOXIC CHEMICAL, SEC 313

*4 = CATEGORY AS REQUIRED BY SEC 313 (40 CFR 372.42), MUST BE USED ON TOXIC RELEASE INVENTORY FORM

*5 = HAZARD CATEGORY FOR SARA SEC. 311/312 REPORTING

HEALTH: H-1 = IMMEDIATE (ACUTE) HEALTH HAZARD

H-2 = DELAYED (CHRONIC) HEALTH HAZARD

PHYSICAL: P-3 = FIRE HAZARD

P-4 = SUDDEN RELEASE OF PRESSURE HAZARD

P-5 = REACTIVE HAZARD

SECTION III | ENVIRONMENTAL RELEASE INFORMATION

THIS PRODUCT IS COVERED BY EPA'S COMPREHENSIVE ENVIRONMENTAL RESPONSE, COMPENSATION AND LIABILITY ACT (CERCLA) PETROLEUM EXCLUSION. THEREFORE RELEASES TO AIR, LAND, OR WATER ARE NOT REPORTABLE UNDER CERCLA ("SUPERFUND"). HOWEVER UNDER SECTION 311 OF EPA'S CLEAN WATER ACT (CWA), THIS PRODUCT IS CONSIDERED AN OIL. AS SUCH , SPILLS INTO OR LEADING TO SURFACE WATERS THAT CAUSE A SHEEN MUST BE REPORTED TO THE NATIONAL RESPONSE CENTER, 800-424-8802.

THIS PRODUCT IS AN OIL UNDER 49 CFR (DOT) PART 130. IF SHIPPED BY RAIL OR HIGHWAY IN A TANK WITH A CAPACITY OF 3,500 GALLONS OR MORE, IT IS SUBJECT TO THE REQUIREMENTS OF PART 130. MIXTURE SOLUTIONS IN WHICH THIS PRODUCT IS PRESENT AT 10% OR MORE MAY ALSO BE SUBJECT TO THIS RULE.

RCRA INFORMATION

SECTION IV |

IF THIS PRODUCT BECOMES A WASTE, IT WOULD NOT BE A HAZARDOUS WASTE BY RCRA CRITERIA (40 CFR 261). PLACE IN AN APPROPRIATE DISPOSAL FACILITY IN

COMPLIANCE WITH LOCAL REGULATIONS.

WE ARE PROVIDING OUR MOST RECENT MATERIAL SAFETY DATA SHEET AND/OR ENVIRONMENTAL DATA SHEET. IF YOU WISH TO RECEIVE UPDATES TO THIS INFORMATION, PLEASE CALL SHELL'S GENERAL MSDS ASSISTANCE LINE (713-241-4819) TO ENSURE THAT YOU ARE ADDED TO SHELL'S REGULAR MSDS DISTRIBUTION SYSTEM.

> SHELL OIL COMPANY P.O. BOX 4320 HOUSTON, TX

FOR ADDITIONAL INFORMATION ON THIS ENVIRONMENTAL DATA PLEASE CALL (713) 241-2252

FOR EMERGENCY ASSISTANCE PLEASE CALL

SHELL: (713) 473-9461 CHEMTREC: (800) 424-9300

******************** THIS MSDS HAS BEEN PROVIDED IN AN ELECTRONIC FORMAT FOR USE IN THE CHEMTREC EMERGENCY RESPONSE PROGRAM AND/OR OTHER APPROVED PROGRAMS. THIS FORMAT MAY CONTAIN BLANKS WHERE INFORMATION WAS NOT AVAILABLE OR NOT APPLICABLE AND THEREFORE MAY NOT BE FULLY COMPLIANT WITH THE OSHA HAZARD COMMUNICATION STANDARD. IF YOU PURCHASE OR USE THIS SHELL PRODUCT AND HAVE NOT RECEIVED A MSDS FROM SHELL PLEASE CONTACT US AND WE WILL PROVIDE ONE. THIS WILL ENSURE THAT YOU RECEIVE UPDATES OF THIS INFORMATION.
